

The Eye of the Bricoleur

GRAY READ

Florida International University

Who is the architect any more? In the face of environmental crisis, the cries of utopian masters of the universe ring hollow. To engage the larger ecological mission, the architect's ethical responsibility has shifted and broadened, turning focus to larger systemic issues that do not necessarily have people at the center. In this new reality, what models or myths can be cobbled together out of our tradition to construct a new stance for the future? This paper looks at the figure of the bricoleur as constructed by anthropologist Claude Levi-Strauss, the handyman/inventor who improvises to remake old things to serve new purposes. In Levi-Strauss' telling, the bricoleur stands opposed to the engineer, who imagines an ideal solution to a problem. The bricoleur first studies the materials and situation at hand, engaging things not as inert objects obedient to a human subject, but as active entities, each with a specific history, character, and inexhaustible potential for the future, either in relation to people, or not. As improviser and inventor the bricoleur is useful in times of crisis. He appears at the very end of Vitruvius's 10 Books of Architecture defending the city from a marvelously engineered war machine. The situated, material intelligence of the bricoleur is called for now to help reimagine ourselves and our machines within rather than outside a wounded ecosystem.

WHO ARE OUR GODS?

The architecture gods that we turn to: Corbu and the starchitects, even Vitruvian gods and the Greek Daedalus, have largely failed to give us eyes and ears for the natural world. Blind-sided by the ecological degradation they have caused, they don't know what to do about it. Howard Roark is the worst of them, the misunderstood visionary who struggles to have his utopia built in all ignorance of its consequences. The current ecological crisis demands we look more deeply into the heroes and stories that define us and reconsider the myths of architecture within a larger non-human field.

Anthropologist Claude Levi-Strauss described myth-making itself as the work of bricolage, the process of reusing the things at hand to cobble together something to serve a new purpose. Like an old tire re-used as a rope swing, the previous form is still present, yet reinterpreted for a new position, new use, and new meaning. Levi-Strauss wrote that myth appropriates existing images that yet retain pentimenti of their past uses as the means to create new constructs to serve new purposes, like a pagan festival turned Christian.¹

The bricoleur, as an almost mythic figure itself, may be some help. The bricoleur has long been associated with folk artists who build with bric-a-brac and found objects such as the postman Cheval mentioned by Levi-Strauss directly.² In that tradition architect Antonio Gaudí laid up stone from the site to create the landforms of Parc Guëll, some of which Josep Maria Jujol finished with mosaics in broken bits of tile and ceramic plates. The work emerges from experimentation with materials that always already have another identity, whether natural or man-made.

The bricoleur turns up in another role in popular culture as the one who can manage under chaotic conditions, the spy who can devise a plan on the spot and make what he needs out of pocket lint. This figure comes into view at an intersection between the artist, the survivor, and the inventor, at times appearing as a secondary character who guides a hapless hero through a difficult situation. For example, a bricoleur of sorts turns up in Terry Gilliam's film *Brazil* in the jumpsuit of Harry Tuttle, heating engineer, who arrives by stealth to repair building systems (Figure 1). Like a field surgeon, he opens up the wall to find a throbbing mass of wires and ducts that he wrangles physically to find the problem, fix it and close the wall back up again. He turns out to be a rebel against the totalitarian state and his work fundamentally subversive. He says, "I'm in it for the excitement. Get in get out, go where there's trouble." The ducts he wrestles seem alive, with a will of their own.

During the Postmodern moment in the 1960s and 70s, the architect was briefly imagined as a bricoleur, one who brings together bits and pieces excavated out of architectural history, to create a new form of expression, like language brings together words. In particular Colin Rowe described the city as a collage and architect/urban designer as bricoleur, albeit tempered by the engineer.³ Robert Venturi advocated 'messy vitality' in which no building was complete in itself, rather each was a part of the city, inflecting toward its neighbors as row houses lean on each other for support. Their ideas found a parallel in literary theorist Jacques Derrida, who wrote that words and ideas are meaningful only because they have a dense history of use, therefore all utterances are bricolage that put together bits and pieces of language toward the intentions of the speaker. Words always have their history still attached and are already open to interpretation.⁴



Figure 1: Harry Tuttle, “heating engineer” in Terry Gilliam’s *Brazil*

Revisiting the bricoleur now, when the crisis climate change is upon us and architects in particular face the challenge of creating a circular economy in which all materials are recycled and recyclable, another aspect of the figure comes to the fore. Levi-Strauss described the bricoleur as one who starts a project by studying the materials at hand. While the engineer approaches a project by aligning it with an ideal to seek the best of all possible solutions, the bricoleur looks with an interpretive eye at the things immediately available, local and on the ground. The bricoleur brings the project to the materials and asks them what they can do, opening a dialogue with supposedly inert stuff. The work is improvised, responsive and often spontaneous, as materials reveal to the practiced eye of the workman qualities of their substance and potential for use.

As Levi-Strauss describes it, bricolage centers on physical action, not representation. He explains that carved or painted images in indigenous societies are not pictures of the gods, rather embodiments used in ritual and work that summon them to do something real in the world. Levi-Strauss offers the example of a club carved into the form of a sea monster that is made by the Tlingit people of the Northwestern United States to kill fish (Figure 2). He explains that the club becomes the monster in the hand of a man, such that the man-monster kills fish.⁵ He notes that the carver of the club did not have a monster to pose as a model, rather he worked a specific piece of wood with the tools he had to discover within it a well-balanced club and a fish-killing monster, “as if its immutable being were finally fixed in the wood.”

Granted this is magical thinking, and it deflects agency away from the fish-hunter, allowing him to duck responsibility for the killing. It also deflects authorship away from the maker of the club, who can almost be seen as an agent for the monster. The monster enters the club through the hand of the carver. Yet there is truth in it. The idea and the form of the sea monster existed in other fish-hunting clubs before the carver of this club even started the work, probably before he was born. Does not the tradition of the idea, image, and action, which is independent of any single person, bear some responsibility for the particular instance? And does not the object itself, the

embodiment of the monster, bear partial responsibility for its action? If so, then the hunter, the fish, the club, and the monster are all active players in providing a meal for the village. If something goes wrong and fish are scarce, then the relationship is in danger and a solution must be found in negotiation. Recall that the Tlingit people lived on the same landscape for 10,000 years without exhausting its resources.

Returning to the carver who reveals the fish-killing club and the figure of the monster in the piece of wood by using the familiar tools at hand, what is the nature of the art? Does it lie in an ability to see the monster and, in the Western tradition, to carve away everything that isn’t monster. Or does the monster start in the piece of wood and then develop in the working relationship between the grain and the knife in hand? In the latter case, a piece of wood with a strong and active grain, say where a branch springs from the trunk would be a better partner in giving form to the monster than an entirely docile straight grained chunk. The living form of the tree would strengthen the body of the club-monster. The tree then continues in the form of the club as well as its material substance, giving it weight, resilience, color, and hardness. In this scenario the skill of the carver is largely an ability to reveal the monster that already exists in the tree, even if he doesn’t know at the outset, or indeed until the club is finished, what exactly the monster will look like. He depends on the wood and the knife to give him clues. The carver’s eyes and his body are alert to pick up the movement of the grain and to take its suggestions of form. Levi-Strauss writes, “The monster’s position, appearance and expression owe nothing to the historical circumstances in which the artist saw it, in the flesh or in a dream, or conceived the idea of it.”⁶ The carver seeks the monster-club in the forest with eyes and body open to recognize it. Or perhaps every tree contains multiple creatures in its living grain.

Political philosopher Jane Bennett describes a vibrant world in which all things, whether living or not, manufactured or raw, are “lively forces at work around and within us.”⁷ Her seminal work recasts the human subject as one among many things, animals, ideas and ecosystems that may act purposefully in relation to each other, whether they have a sentient brain or not. She joins contemporary thinkers Bruno Latour, Manuel DeLanda, Luce Iregaray, and Judith Butler in shifting away from the humanist valorization of the subject toward a tradition of ecological thought grounded in ancient vitalism and developed from Lucretius through Baruch Spinoza, Henry David Thoreau, and Gilles Deleuze/Felix Guattari. Thoughts themselves are made of stuff, situation, relationship, and interpretation. Bennett writes that this non-human turn might “help us live more sustainably, with less violence toward a variety of bodies... to feel more of the liveliness hidden in such things and reveal more of the threads of connection binding our fate to theirs.”⁸



I argue that the Levi-Straussian figure of the bricoleur describes a material way of thinking that has at least some of the qualities that might reinvent architecture for a sustainable society. Most immediately bricolage moves toward a zero-waste practice that starts and ends in materials. The bricoleur values things that have already been used over those with no experience, studying them to discover how they might answer the situation at hand. Each new problem to solve is an opportunity to query materials afresh and find out what they can do. From this point of view, materials are not pinned to their definition nor encompassed by description and always hold something more to be learned. This inexhaustible quality of being is not an essence in a Heideggerian sense, but a richness of potential, which is always more than can be known.⁹ Grounded in the physical, the work of the bricoleur is messier, more contingent, more time-bound, and more open to change.

In this way, thinking as a bricoleur puts things back in time. Buildings are neither permanent nor final, but way-stations for materials and for people, who have other histories and other potentials. One configuration does not eliminate others. The most successful projects and all of their constituent parts stand open to reinterpretation, like the spolia of Rome became building material for the city that rose among the ruins. A lovely example is the church of San Lorenzo in Miranda near the Roman Forum, an amalgam of additions and removals over two millennia centered in an ancient temple initially dedicated to Faustina, the wife of Antonius Pius in 141 AD.¹⁰ The cella of the temple became the nave of the church, and its portico was reinterpreted by the addition of a baroque façade. Parts of the temple and the church were dismantled at various times during its history and the stones used in other construction. Everything is valuable, and nothing is lost.

A truly sustainable economy requires re-using materials at every level of manufacture in a system that produces no waste.

Figure 2: Tlingit fishing club illustrated in Claude Levi-Strauss, *La pensée sauvage*, 1962.

A circular economy requires rapt attention to the physical, both in the disciplined manner of the scientist and in everyday choices, asking: Where does a thing come from (what is its history)? What role did it play previously? And what will it become after it is no longer useful to us? Innovations often require leaping across categories and well beyond the manufacturer's recommendations. This kind of opportunistic and cross-disciplinary thinking is celebrated in the contemporary world of startups and disruptive technology. The innovative entrepreneur, like the industrial inventors of the early 20th century, will go wherever a good synthesis can be found. The shift yet to accomplish is to ground this innovation in a broader ecological economy that extends beyond the human.



Figure 3. Temple of Antonius and Faustina, Rome (Giovanni Battista Piranesi. *Vedute di Roma*, 1751)

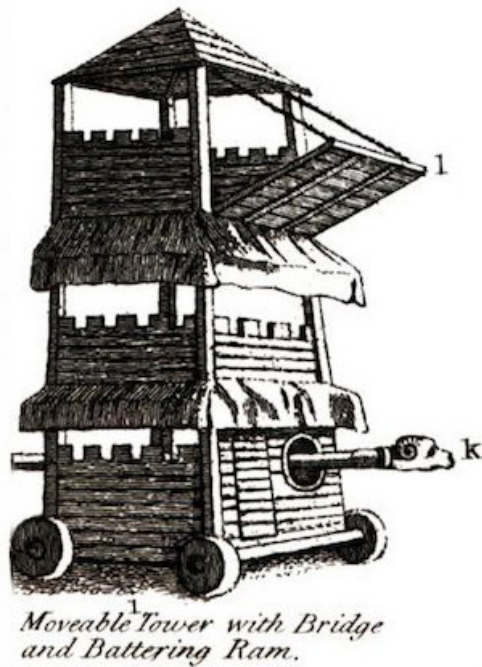


Figure 4. Helepolis siege tower (Source: Grose, Francis: "The Antiquities of England and Wales Vol I" (1783)).

Levi-Strauss adopted the French word *bricoleur*, meaning handy man or tinkerer, to describe the kind of thinking that he found in indigenous tribes, including those he visited in Brazil and those that other anthropologists, particularly Franz Boas, had described. He argued that the 'savage mind' of the *bricoleur* had invented the most extraordinary advances of civilization: agriculture, animal husbandry, and metallurgy. Far from being a weak precursor to science and technology, or worse a method of random trial and error, this expansive intelligence drove innovation through acute observation, broad knowledge, and cunning recognition of opportunity.

Bricolage is also recognizable in the most ancient tradition of architecture. And here we might re-use some of our own myths toward a new purpose. Vitruvius uses the word *solertia* to describe inventiveness, particularly of devices or machines. In the last book of his treatise Vitruvius used the term to describe the architect who built a machine to count miles traveled by counting revolutions of a measured cart wheel by means of a tooth that advances a sprocket.¹¹ Even more compelling, the last story in the last book of Vitruvius recounts the triumph of Diognetus, a Rhodian architect who saved his city from a war machine devised by its enemy.¹² King Demetrius of Macedon threatened Rhodes, advancing on the city with an enormous helepolis, a rolling tower that could carry catapults and spear throwers up to the city wall. Confronted with such a huge device the people found even their most advanced defenses inadequate. In crisis, they turned to Diognetus, who had built such machines himself, yet was considered old fashioned and past his prime. Diognetus ordered a hole cut in the

city wall facing the path of the advancing helepolis. During the night, he directed the people to pour huge quantities of water and sewage out of the hole. The next day the wheels of the helepolis sunk in a quagmire of stinking mud. Demetrius' army had no choice but retreat, leaving their machine behind, which became Diognetus' prize and payment. The most foul of waste was the means for defeating the most ambitious engineering and the architect's material cleverness was celebrated through retelling the story.

Diognetus is needed now to think outside of the profession of building, consider waste a resource, rally people together, and save the us from the consequences of our own machines. The *bricoleur*, long a minor figure in architecture's pantheon, comes to the fore in times of crisis: part survivalist, part inventor, and part artist. The *bricoleur* is sometimes a trickster, sometimes a spy, a poor choice for ruler, but the one who can act when the straight-forward logic of the engineer reaches its limits.

ENDNOTES

- 1 True to form mythic figures once emergent deny the unseemly process that created them. They claim that their parentage is pure, as if they sprung from crystalline logic or the collective unconscious, or from God himself. This denial is the same disjunction that operates in detaching ourselves from the natural world and denying that our actions have any affect on its and thus our well being.
- 2 Claude Levi-Strauss, *The Savage Mind*, ed. Julian Pitt-Rivers and Ernest Gellner, trans. Anonymous, The Nature of Human Societies Series (Chicago: University of Chicago Press, 1966), p. 17. Cheval was inspired by the figures he saw in pieces of local stone and built a fantastic castle by hand in the south of France.
- 3 Colin Rowe and Fred Kotter, *Collage City* (MIT Press, 1978), p. 104
- 4 Jacques Derrida, "Structure, Sign, and Play in the Discourse of the Human Sciences," in *A Postmodern Reader*, ed. Linda Hutcheon (State University of NY Press, 1993), p. 224.
- 5 Levi-Strauss, *The Savage Mind*, p. 26
- 6 Ibid.
- 7 Jane Bennett, *Vibrant Matter*, (Duke University Press, 2010) Kindle book location 4676
- 8 Jane Bennett, *Vibrant Matter*, location 4901.
- 9 See Bruno Latour, *We Have Never Been Modern*, trans. Catherine Porter (Cambridge, MA: Harvard University Press, 1993), p. 65 in which he takes apart Heidegger's idea of essence by recognizing Being in everything and at all levels.
- 10 Platner, Samuel Ball, (revised by Thomas Ashby), *A Topographical Dictionary of Ancient Rome*, (London: Oxford University Press), 1929. On line version: (http://penelope.uchicago.edu/Thayer/E/Gazetteer/Places/Europe/Italy/Lazio/Roma/Rome/_Texts/PLATOP*/Templum_Antonini-Faustinae.html)
- 11 Vitruvius, *Ten Books of Architecture*, trans. Morris Hinky Morgan (London: Dover Publications, 1960), Book 10, chapter 9, paragraph 1.
- 12 Vitruvius, *Ten Books of Architecture*, Book 10, Chapter 16, paragraph 3-8. The story is unlikely and contradicts the historical account in which the Rhodian soldiers were able to dislodge some of the protective plates of the helepolis causing King Demetrius to pull it back lest it be burned.